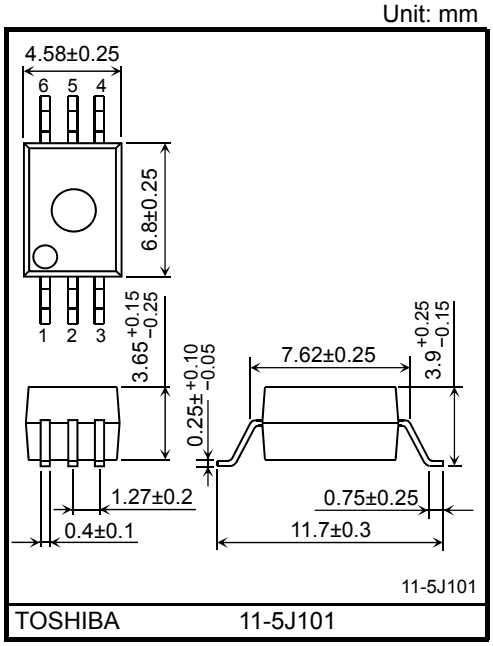
TOSHIBA PHOTOCOUPLER GaAℓAs IRED + PHOTO-IC

TLP719F

Digital logic ground isolation
Line receivers
Microprocessor system interfaces
Switching power supply feedback control
Transistor invertors

Unit: mm



Weight: 0.26 g (typ.)

The TOSHIBA TLP719F consists of a GaAℓAs high-output light-emitting diode and a high-speed detector.

This unit is a 6-lead SDIP. The TLP719F is 50% smaller than the 8-pin DIP and meets the reinforced insulation class requirements of international safety standards. Therefore the mounting area can be reduced in equipment requiring safety standard certification.

The TLP719F has a Faraday shield integrated on the photodetector chip to provide an effective common mode noise transient immunity. Therefore this product is suitable for application in noisy environmental conditions.

Absolute maximum ratings and electrical characteristics are the same as the TLP719 technical data sheets.

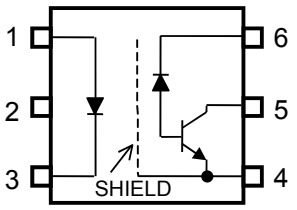
- Open collector
- Package type : SDIP6
- Isolation voltage : 5000 Vrms (min)
- Common mode transient immunity : ±10 kV/us (min) @V_{CM} = 400 V
- Switching speed : t_{pHL}/ t_{pLH} = 0.8 μs (max)
  @ I_F = 16 mA, V_{CC}
  R_L = 1.9 kΩ, Ta = 25 °C
- TTL compatible
- Construction mechanical rating

Creepage Distance	8.0 mm (min)
Clearance	8.0 mm (min)
Insulation Thickness	0.4 mm (min)

- UL recognized : UL1577, File No. E67349
- Option (D4)
  TÜV approved : EN60747-5-2
  Certificate No. R50033433
  Maximum operating insulation voltage : 1140 Vpk
  Highest permissible over voltage : 8000 Vpk

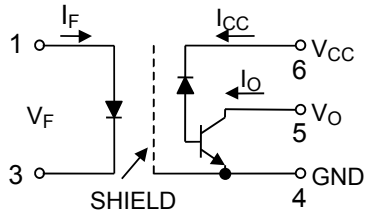
(Note) When an EN60747-5-2 approved type is needed, please designate the "Option(D4)"

Pin Configuration (top view)



1: ANODE
2: N.C.
3: CATHODE
4: EMITTER (GND)
5: COLLECTOR (OUTPUT)
6: V_{CC}

Schematic



A 0.1-μF bypass capacitor must be connected between pins 4 and 6. (See Note 7.)

Start of commercial production
2007/09

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